



**Capacity Building Program/Leadership Development Program for
Trained Graduate Teachers (TGTs) of DOE, GNCTD and DIET/SCERT faculty, Delhi**

**10th Nov 2025 – 14th Nov 2025 (5 Days)
IIT Mandi, Himachal Pradesh**

Details of the Program:

- **No. of proposed participants:** 40
- **No. of participants attended:** 40
- **Stakeholders:** Teachers and facilitators
- **Transaction Methodology:** Interactive sessions, activities and site visits
- **Name of Coordinator:** Dr. Bhartendu Gupta
- **Report by:** Dr. Bhartendu Gupta

Schedule of Training

DAY 1- 10th Nov 2025

Session 1 (9:00am-11:00am): Yoga & Meditation at Maharshi Markandeya Temple

Session 2 (11:00am-1:00pm): Inauguration & IKS overview

Session 3 (2:00pm-4pm): Uniqueness of Indian Music

Session 4 (4:00pm-6:00pm): Human Values, Musicality & Life

DAY 2- 11th Nov 2025

Session 1 (9:00am-11:00am): Indian Music & Mind Brain Consciousness

Session 2 (11:00am-1:00pm): Importance and Structure of Sanskrit Language

Session 3 (2:00pm-4:00pm): Science of Consciousness – Healing the mind, the Sattvik Way

Session 4 (4:00pm-6:00pm): Indian Chemistry and Indian Metallurgy (*Rasashastra*)

DAY 3- 12th Nov 2025

Session 1 (9:00am-11:00pm): Understanding Consciousness, Karma, and the Infinite Source

Session 2 (11:00am-1:00pm): *Krishna — The Source of Everything*

Session 3 & 4 (2:00-6:00pm): Yoga session and Indian Drama

DAY 4- 13th Nov 2025

Session 1 (9:00am-1:00pm): Visit to Parashar Lake

Session 2 (2:00pm-6:00pm): Indian Astronomy

DAY 5 14th Nov 2025

Session 1 (9:00am-11:00am): Yoga & Pranayama for Holistic Development

Session 2 (11:00am-1:00pm): Ayurveda & Diet: The Science of Personalised Nutrition

Session 3 (2:00pm-4:00pm): Introduction to Vedic Literature

Session 4 (4:00pm-6:00pm): Ethical Duty & Sustainable Living (The Bhagavat Gita)

Objectives of the Program

1. Conceptual Understanding: Develop deep awareness of key domains of IKS – mathematics, astronomy, medicine, architecture, arts, linguistics, agriculture, metallurgy, water management, and ethics.
2. Understand philosophical foundations of IKS: Holistic worldview, sustainability, interconnectedness, and “*Vasudhaiva Kutumbakam*”.
3. NEP 2020 Alignment: Enable teachers to implement NEP 2020 mandate of integrating IKS across subjects from foundational to secondary stage. Equip teachers to design competency-based, experiential, and multidisciplinary lessons drawing from IKS.
4. Pedagogical Skills: Train teachers in IKS-based pedagogies: storytelling, toy-based learning, art-integration, field visits, and hands-on experiments using traditional practices. Demonstrates how concepts like zero, pi, Ayurveda, *Vastu*, yoga, and ancient texts can make modern STEM/social science engaging.
5. Curriculum & Assessment: Build capacity to map IKS examples to NCERT learning outcomes, textbooks, and Holistic Progress Card. Develop sample lesson plans, projects, and assessment items that blend IKS with core subjects.
6. Leadership & Ecosystem: Develop teacher-leaders who can mentor peers and create a school culture that values India’s intellectual heritage. s collaboration between school teachers, IIT Mandi faculty, and traditional knowledge practitioners.
7. 21st-Century Connect: Highlight relevance of IKS to SDGs, climate action, mental well-being, and innovation. Explore use of technology, AI, and research to document, validate, and disseminate IKS.

Training Program - Brief Overview

DAY 1 Date: 10th November 2025

SESSION 1 (9:00am-11:00am): YOGA & MEDITATION AT MAHARSHI MARKANDEYA TEMPLE

OBJECTIVE: To explore the historical and spiritual significance of the site

The first day of our training (IKS) was filled with excitement, learning, and new experiences. The day began with breakfast between 8:00 and 9:00 a.m. After finishing breakfast, we went for a trekking activity through beautiful natural surroundings. The visit to the *Maharshi Markandeya Temple* was planned to explore the historical and spiritual significance of the site, as well as to experience peace through meditation and adventure through trekking. The temple, dedicated to the sage Markandeya, is known for its serene environment and natural surroundings. The trail was moderately challenging, passing through dense trees, rocky paths, and scenic viewpoints. The trek provided an opportunity to enjoy fresh air, panoramic views, and the beauty of the surrounding hills.



Maharshi Markandeya Temple

During the trek, we enjoyed the scenic beauty and fresh air, which made the experience even more refreshing. Upon reaching the temple, we were welcomed by a peaceful atmosphere and traditional architecture. The priest shared brief insights into the legend of *Maharshi Markandeya*, who was blessed with immortality by *Lord Shiva*. The calm environment encouraged quiet reflection.

A short meditation session was conducted near the temple premises. Surrounded by lush greenery and the gentle sound of flowing water, the experience was deeply soothing. The session helped improve focus, relaxation, and spiritual connection. The yoga session was conducted by *Mr. Satyam Tiwari*. The session helped us feel calm and energized. Our trip was well-coordinated by *Dr. Pavin*, *Dr. Krishna Panda*, who guided and supported us throughout the activity.

The visit to the *Maharshi Markandeya Temple* was refreshing and fulfilling. The combination of spiritual enrichment through meditation and physical activity through trekking made the experience memorable. It offered a perfect

balance of peace, nature, and adventure.

SESSION 2 (11:00am-1:00pm): INAUGURATION & IKS OVERVIEW

OBJECTIVE: Introduction to the content of IKS Training

After completing the yoga session, we returned from trekking and assembled in Hall A. There, we had an introductory session with the IKS (Indian Knowledge System) faculty. The inauguration ceremony was conducted by *Dr. Venkatesh*, *Dr. Neha Thakur*, *Dr. Arnav Sir*, and *Dr. Krishna*. Following the inauguration, *Dr. Venkatesh* gave a short introduction about IKS. Later, *Prof. Laxmidhar Behera*, Director of IIT Mandi, joined us and spoke about the importance and need for IKS. He also discussed several characters from the *Mahabharata* and explained their significance. The session was highly insightful and helped us understand the deep connection between traditional knowledge and modern learning.

As told by the IKS faculty, the Indian Knowledge System refers to the rich intellectual, scientific, artistic, and philosophical traditions that evolved in India over thousands of years. It includes fields like Ayurveda, Yoga, mathematics, astronomy, linguistics, architecture, ecology, ethics, and education.

1. Deep Cultural and Philosophical Insight: IKS preserves India's heritage by offering profound insights into life, values, and the relationship between humans and nature. It helps develop moral, ethical, and holistic perspectives.

2. Scientific and Intellectual Contributions: India's ancient scholars contributed significantly to mathematics (zero, decimal system), astronomy, metallurgy, medicine, and linguistics. IKS highlights these achievements and corrects historical gaps or misconceptions.

3. Holistic Health and Wellness: Systems like *Ayurveda*, *Yoga*, and *naturopathy* promote mental and physical well-being through natural methods. Today, they are practiced globally and provide alternative, preventive health approaches.

4. Sustainable Living and Environmental Wisdom: IKS emphasizes harmony with nature. Traditional practices in agriculture, water conservation, architecture (like Vastu and stepwells), and ecology promote sustainability and environmental balance.

5. Strengthening Education: Understanding IKS helps integrate indigenous knowledge with modern education. It encourages multidisciplinary thinking by combining science, humanities, and ethics.



Team of 40 teachers including coordinators (SCERT) with esteemed faculty of IIT Mandi

SESSION 3 (2:00pm-4pm): UNIQUENESS OF INDIAN MUSIC

OBJECTIVE: To understand Indian music and its relation to IKS

After lunch, we attended a wonderful session conducted by Dr. Archi Banerjee on Indian music and its relation to IKS. She explained the five elements of music, four levels of sounds, and how Indian music differs from Western music. Dr. Archi also spoke about the philosophy and history of Indian music and demonstrated how beats and ragas can express different emotions such as happiness, sadness, and excitement in the same song. We also experienced meditation through music with beats, which was relaxing and enlightening. Her live performance made the session even more engaging and enjoyable.

Dr. Archi pointed out why her research matters:

- **Bridging Tradition and Science:** Banerjee's work builds a bridge between centuries-old musical traditions and modern neuroscience/physics.
- **Therapeutic Implications:** Understanding how ragas affect brain rhythms and emotions could support music therapy (Raga Chikitsa).
- **Cultural Insight:** By quantifying aspects of Indian music, her research helps preserve and legitimize its uniqueness in global scientific discourse.

- **New Knowledge:** Her methodology (combining EEG, fractal analysis, etc.) offers new ways to study not only Indian music, but potentially other musical traditions too.



Dr. Archi Banerjee leading her session on Indian Music

SESSION 4 (4:00pm-6:00pm): HUMAN VALUES, MUSICALITY & LIFE

OBJECTIVE: Insightful exploration of the deep connection between music, human emotions

The session titled “Human Values, Musicality & Life” by Dr. Archi Banerjee was an insightful exploration of the deep connection between music, human emotions, and the values that guide our lives. The objective of attending the session was to understand how music influences the human mind, how values are shaped through emotional experiences, and how musicality contributes to well-being and personal growth.

Key Highlights of the Session

a. Human Values and Emotional Sensitivity

Dr. Banerjee explained how values such as empathy, compassion, peace, and devotion are closely linked to our emotional responses. She emphasized that music plays a major role in nurturing these values by creating shared emotional experiences.

b. Musicality and the Human Brain

The speaker presented scientific insights from her research on *EEG readings*, *non-linear dynamics*, and **fractal analysis**. She demonstrated how the brain responds uniquely to different musical patterns, especially in Indian classical ragas. She also highlighted how improvisation in music activates creativity, imagination, and deeper cognitive processes.

c. Music as a Source of Well-Being

The session showed how musical experiences reduce stress, regulate emotions, and promote mental balance. Dr. Banerjee connected music with the science of happiness, explaining that listening to or performing music can improve concentration, calmness, and emotional stability.

d. Link Between Music and Life Philosophy

A significant part of the session focused on how music mirrors life: its highs and lows, pauses, rhythms, and transitions. Dr. Banerjee related musical structure to life lessons—such as patience, harmony, discipline, and acceptance.

e. Integration of Science and Spirituality

The speaker beautifully blended scientific explanations with cultural and spiritual elements of Indian music. She discussed how devotional ragas evoke specific emotions like serenity and devotion, supporting both personal and social well-being.

3. Personal Learning and Reflections

Attending this session helped me understand music not just as an art form but as a profound tool for emotional growth and value formation. I learned that:

- Music can be used consciously to maintain inner balance.
- Our brains respond differently to joyful and sorrowful ragas.
- Creativity in music enhances problem-solving and imagination.
- Values like empathy and peace can be strengthened through musical engagement.

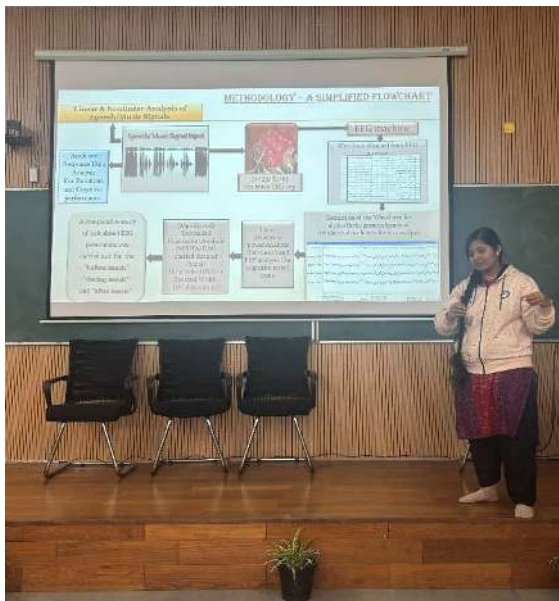
CONCLUSION of DAY 1: Throughout the day, we learned many new things that we had never known before and gained a deeper understanding of what actually the Indian Knowledge System refers to. Every session—from trekking to yoga, to knowing Indian music—was amazing and full of valuable learnings. The entire day helped us connect with our culture, enhance our knowledge, and appreciate the richness of Indian traditions.

We also learnt how music can be used to calm our students and increase concentration thus increasing in productivity.

DAY 2 Date: 11TH November 2025

SESSION 1 (9:00am-11:00am): INDIAN MUSIC & MIND BRAIN CONSCIUSNESS

OBJECTIVE: To understand the impact of Indian music on the mind, body, and brain.



Dr. Archi Banerjee leading her session on Indian Music & mind brain consciousness

Dr. Archi explained, based on her research and experience, that listening to or performing music activates different parts of the brain. She stated that during musical activity, the hands, eyes, and brain work together, resulting in improved fine motor coordination and visual processing. She further explained that hormones such as dopamine, endorphins, and oxytocin become active due to the influence of music, making a person feel calm and joyful.

Using examples of Indian classical music, she described how rhythm, tempo, and melody affect human emotions and memory. Music is not only a means of entertainment but also an effective tool for mental health and cognitive development. It reduces stress, increases concentration, and promotes emotional stability.

Music connects our mind, body, and brain, creating a sense of happiness and balance.

As Dr. Archi said — “Music melts stress away,” meaning that music dissolves stress and makes the mind

lighter and happier.

1. Raga as a Complex, Emotional Structure

■ In Hindustani classical music, *ragas* are not just scales — they carry distinct emotional moods (rasas). Archi Banerjee’s research shows that different ragas evoke different emotional states in listeners.

■ She quantitatively analyses these emotional experiences using **non-linear mathematical tools** (like MF DFA — Multifractal Detrended Fluctuation Analysis) to capture the complexity inherent in ragas.

2. Neuro-Cognitive Response to Music Creation and Listening

- Banerjee's studies look into what happens in musicians' brains when they *create* (improvise) a raga versus when they *listen* to the same raga.
- For example, in one EEG study, she and her co-researchers found that during mental improvisation, certain brain regions (like occipital and frontal lobes) show strong activity.
- This means that Indian classical music engages the brain in deeply creative ways, not just passively.

3. Scientific Validation of Guru–Shishya Tradition

- Through her multifractal analysis of performances across generations within the same *gharana* (musical lineage), she quantifies how singing styles evolve but also preserve tradition.
- These findings give a scientific basis to the philosophical and pedagogical concept of *guru–shishya parampara* (teacher-student lineage) in Indian classical music.

4. Emotion and Arousal Measured Quantitatively

- In her “chaos-based neuro-cognitive” study, she showed that EEG brain rhythms (alpha and theta waves) vary significantly when people listen to ragas with contrasting emotional qualities (e.g., joyful vs. pathos).
- Using signal-processing and fractal dimension tools, she ties emotional arousal to measurable complexity in brain activity.

5. Universality vs Domain-Specificity of Musical Emotion

- She explores how emotional responses to music are both **universal** (shared across people) and **domain-specific** (depending on the musical tradition) via non-linear EEG analyses.
- This helps explain why Indian classical music feels culturally unique but also has effects on the brain that resonate more broadly.

6. Innovative Methodology: Fractal & Non-linear Physics

- Instead of just doing qualitative musicology, she applies *physics-based techniques* (fractal dimension, chaos theory) to understand music and brain activity.
- This gives a powerful, quantifiable lens to study something as nuanced and subtle as raga improvisation or emotional content in music.

SESSION 2 (11:00am-1:00pm): IMPORTANCE AND STRUCTURE OF SANSKRIT LANGUAGE

OBJECTIVE: To learn why Sanskrit is known as the “Mother of all Languages.”

Dr. Krishna Panda taught Sanskrit in a very interesting and engaging manner. He communicated entirely in Sanskrit and narrated a beautiful story.

He also conducted the recitation of the 15th chapter (*15th Adhyaya*) of the *Shrimad Bhagavad Gita*. He explained that—

- Sanskrit is the root of all languages; other languages are its branches and fruits.
- Language originated through *Naamkaran* (naming), and the ability to communicate is what truly defines language.
- “*Sanskritam*” means “*well-structured*” or “*pure language*”
- He described Sanskrit as the “Divine Language,” a flawless and sacred form of speech.
- UNESCO has called Sanskrit “a masterpiece of structured language.”
- Panini created the first algorithmic language through nearly 4000 rules in the *Ashtadhyayi*.
- Sanskrit is phonetically perfect — no silent letters and no irregularities in pronunciation.
- Word formation involves a logical use of prefixes, suffixes, and morphological rules.

SESSION 3 (2:00pm-4:00pm): SCIENCE OF CONSCIOUSNESS – HEALING THE MIND, THE SATTVIK WAY

OBJECTIVE: To understand how Sattvik lifestyle can bring mental peace and emotional healing

Prof. Behera explained Atma Jnana using verses from the Bhagavad Gita (BG 2.13, 2.17, 2.22, 2.23, etc.). He stated that when a person focuses on material objects, it initiates the chain:

Attachment → Desire → Anger → Delusion → Destruction of intellect

The session emphasized that the soul is eternal — it cannot be burned, cut, or destroyed.

He explained that lust, anger, greed, attachment, ego, and jealousy residing in the mind are the true causes of suffering.

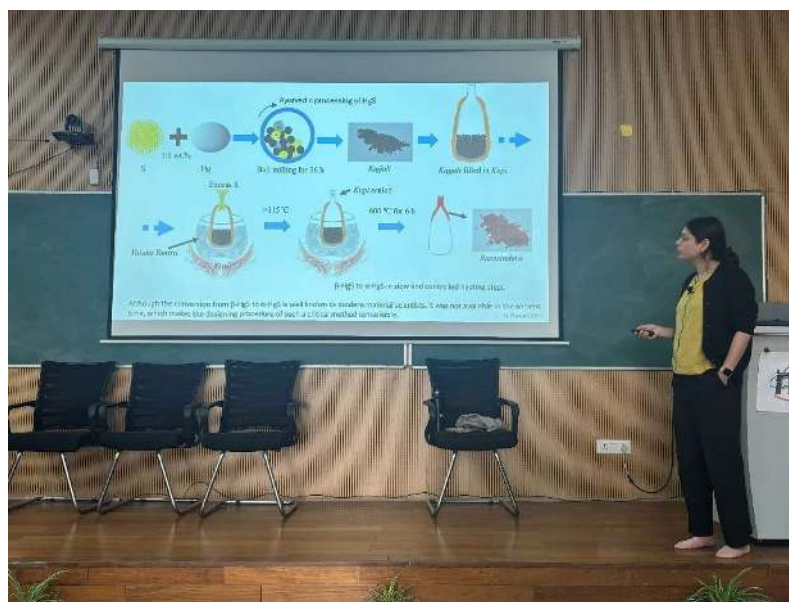
Through contemplation and self-knowledge, a person can free himself from mental stress and attachment.

Conclusion:

1. The root of stress lies within us, not in the external world.
2. Purification of the mind and knowledge of the soul are the real forms of healing.
3. By adopting a Sattvik lifestyle and rising above desire and attachment, one can attain lasting peace and happiness.
4. When the mind becomes steady and the nature of the soul is understood, a person remains unaffected by the ups and downs of life — this is the essence of Conscious Living.

SESSION 4 (4:00pm-6:00pm): INDIAN CHEMISTRY & INDIAN METALLURGY (*rasashastra*)

OBJECTIVE: Important Aspects Related to Indian Chemistry, Culture, Science, and AYUSH



Dr. Neha Thakur explaining "Extraction of Rasasindura in ancient Indian chemistry"

1. Need to Connect Indian Chemistry with Culture and Science

→ Dr. Neha Thakur stated that Indian Chemistry is not limited to laboratories; it is deeply connected with Indian culture, traditions, and daily life.

→ She emphasized the following points:

→ Ancient Indian science had a strong foundation in chemistry — including alchemy, metallurgy, Ayurveda, dye chemistry, and food preservation.

→ The purpose of connecting Indian Chemistry with culture is to help students understand that science is not something external; it is an integral part of our civilization.

2. Discussion on Dravya Shastra (Science of Substances)

→ Dr. Thakur explained that Dravya Shastra is an important part of traditional Indian science. It includes:

→ Properties of substances

→ Nature of substances

→ Effect of substances on health

→ Preparation of medicines

→ Use of metals and minerals

→ She explained that Dravya Shastra is the ancient Indian counterpart of modern chemistry, where substances were classified according to their properties and effects.

3. Why Ayurveda Is Losing Its “Quality/Credibility”?

→ Dr. Thakur explained that although Ayurveda contains vast knowledge, its credibility is declining due to certain reasons:

→ Lack of alignment with modern scientific methods

→ Spread of misinformation and myths among people

→ She stated that Ayurveda has immense potential, but it must be supported by scientific evidence, modern research, and quality control.

4. Discussion on AYUSH and Its Quality

→ She discussed the present situation of AYUSH (Ayurveda, Yoga, Unani, Siddha, Homeopathy):

→ AYUSH has enormous knowledge, but it needs proper standardization.

→ Integrating AYUSH with modern science can strengthen its global recognition and reliability.

CONCLUSION of DAY 2: On the 2nd day we not only practiced Indian Music but also learnt the scientific aspects of effects of Indian *Ragas* on our nervous system. In addition to that we were enlightened by Dr. Panda on our root language *Sanskrit*, how is it the simplest language and why is it called the mother of languages. Practicing the 15th *adhyaya* of *Bhagvad Gita* gave us immense peace.

Lecture by *Dr. Neha Thakur* taught us how much of modern science was already being studied in Ancient India. *Rasashastra* was discussed and insights on Indian Chemistry were given. Thoroughly new information was given and that surely opened our eyes and opened a whole new gamut of field for further learnings.

Day 3 Date: 12th November 2025

SESSION 1 (9:00am-11:00pm): UNDERSTANDING CONSCIOUSNESS, KARMA & THE INFINITE SOURCE

OBJECTIVE: To deepen participants’ understanding of philosophical, psychological, and spiritual perspectives related to human existence.

The third day of the training program began with deep intellectual and spiritual engagement on the theme of Consciousness, Karma, and the Ultimate Reality. The sessions were designed to deepen participants’ understanding of philosophical, psychological, and spiritual perspectives related to human existence and universal order.

The discussions also introduced the concept of *Karma* and the three *Gunas* — *Rajogun*, *Tamogun*, and *Sattvagun*, representing the forces of creation (*Srishti*), preservation (*Paalan*), and dissolution (*Vinash*) that govern all aspects of life. These principles were linked to the three types of responsibilities — intellectual (creative thought), administrative (sustaining order), and service provider (supportive action) — helping participants relate cosmic balance to personal and professional duties.



Dr. Venkatesh leading the session on Science of Consciousness

The objectives of the day were:

1. To explore and compare Western and Indian ideas of consciousness, understanding how both philosophical traditions interpret the origin, nature, and function of awareness.
2. To understand the concept of Krishna as the infinite source of both material and spiritual worlds, highlighting the interconnection between divinity, creation, and consciousness.
3. To examine the philosophy of Karma and the three Gunas, understanding their impact on human behavior, responsibility, and balance in nature and professional life.
4. To promote experiential and participatory learning through creative expression, using a drama activity to internalize philosophical ideas and represent them through performance.
5. To develop reflective, collaborative, and

communicative skills among participants through interactive and experiential learning methods that combine theory with practice.

6. To encourage critical and comparative thinking, enabling participants to relate abstract philosophical concepts to personal, educational, and social contexts.

Each session of the day blended theoretical discussion with practical application, helping participants connect philosophy with real-life experiences and classroom practices.

The day commenced with an insightful discussion on the concept of consciousness. The speaker began by tracing the evolution of the idea in the Western world, from Plato's philosophical reflections to René Descartes' assertion — "*I think, therefore I am.*" Consciousness was described as an emergent phenomenon of brain activity. The error theory was also discussed, which distinguishes between philosophical understanding and spiritual realization.

The conversation then moved to the Indian philosophical perspective, where consciousness is not viewed as a mere by-product of the physical brain but as the eternal, divine core of existence. Participants were introduced to the three *Gunas* — *Rajogun* (activity and creation), *Sattvagun* (knowledge and harmony), and *Tamogun* (inertia and destruction) — and how they operate as cosmic energies maintaining balance in the universe. These forces were linked to the human roles of intellectual creators, administrative preservers, and service providers, emphasizing that awareness and Karma together shape both personal and universal order.

SESSION 2 (11:00am-1:00pm): Krishna — The Source of Everything

OBJECTIVE: To explore Lord Krishna as the supreme source of creation and connect the Gita's teachings on Karma, Gunas, and Leela to cultivating balance, selfless action, and awareness in life and teaching.

The **second session** focused on "*Krishna — The Source of Everything.*" Drawing inspiration from the *Bhagavad Gita*, the discussion explored the idea that Lord Krishna is the supreme consciousness and the infinite origin of all creation. Though infinite forms arise from Him, He remains complete and perfect — the embodiment of *Purnam* (wholeness). The session also connected Krishna's divine play (*Leela*) with

the law of Karma and the three Gunas, explaining how every action (*Karma*) arises from these forces and ultimately returns to the Supreme Source. Participants reflected on how these ideas illuminate the path of balance, selfless service, and awareness in both spiritual and professional life.

अहं सर्वस्य प्रभवो मत्तः सर्वं प्रवर्तते।
इति मत्वा भजन्ते मां बुधा भावसमन्विताः॥

Transliteration:

**aham sarvasya prabhavo, mattaḥ sarvaṁ pravartate
iti matvā bhajante mām, budhā bhāva-samanvitāḥ**

Meaning:

“I am the source of all spiritual and material worlds.
Everything emanates from Me.
The wise, who know this perfectly,
engage in My devotional service with all their hearts.”

SESSION 3 & 4 (2:00pm-6:00pm): Yoga session and Indian Drama

OBJECTIVE

: To equip teachers with Yoga and Pranayama practices for students’ physical-mental well-being, and with Indian drama techniques from Natyashastra for experiential, value-based learning & to foster holistic development by integrating mind-body wellness and creative expression into daily classroom practices as envisioned in NEP 2020.

In the third part of the day, participants actively engaged in play activity. Divided in to small groups and all the participants diligently practiced the dialogues and other components of the Sanskrit skits, “*Ram Van Gaman*” and “*Kishkindha Kand*” in preparation for their stage play.

The day concluded with a refreshing Yoga session, where all participants enthusiastically took part. The session included warm-up exercises, *Surya Namaskar*, and *Anulom Vilom pranayama*. The Yoga practice helped integrate body, mind, and spirit, complementing the day’s theme by promoting mindfulness, self-discipline, and balance.

Yoga and Pranayama are ancient Indian practices that promote physical, mental, and spiritual well-being. Rooted in the wisdom of the Vedas and the yogic traditions of Patanjali, these practices help cultivate balance, inner peace, and holistic health. Regular practice has gained global recognition for its transformative impact on lifestyle and overall wellness.

Various pranayama techniques were practiced, including:

- **Anulom Vilom (Alternate Nostril Breathing):** Balanced the nervous system and calmed the mind
- **Bhastrika (Bellows Breath):** Energized the body and improved lung capacity
- **Kapalbhati (Skull-Shining Breath):** Enhanced metabolic activity and mental clarity
- **Bhramari (Humming Bee Breath):** Reduced stress and induced relaxation

Each technique was introduced with proper instructions and was practiced under guidance to ensure safety and effectiveness.



Warm up session before Surya Namaskara

CONCLUSION of DAY 3: The third day of the training program was both intellectually enlightening and spiritually rejuvenating. Through the combined exploration of Consciousness, Karma, and the Infinite Source, participants gained a holistic understanding of human existence as a union of action, awareness, and divinity.

The introduction of *Rajogun*, *Sattvagun*, and *Tamogun* deepened participants' understanding of how these universal energies influence thought, behavior, and responsibility — from the creative and administrative to the service-oriented roles that sustain life. These discussions inspired reflection on the importance of balance and mindfulness in personal and professional conduct.

The drama activity served as an engaging platform to internalize and express these profound ideas creatively, while the Yoga session at the end provided a peaceful closure, allowing participants to harmonize mind and body. The *Surya Namaskar* and *Anulom Vilom* exercises reinforced the connection between philosophy, physical well-being, and self-awareness.

Day 4 Date: 13th November 2025

SESSION 1 (9:00am-11:00am): VISIT TO PARASHAR LAKE

OBJECTIVE: Meditation at Parashar Lake and knowing Indian heritage

The day began with breakfast at 7:30 AM, following which all participants departed for a visit to Parashar Lake at 8:00 AM. The group, consisting of 40 members, spent quality time exploring the scenic surroundings of the lake. Participants walked around the lake, visited the ancient Parashar Temple, clicked photographs, and enjoyed the serene beauty of nature. A lunch was arranged at the lake premises, providing everyone an opportunity to relax and rejuvenate amidst the picturesque setting.



Visit to Rishi Parashar Lake

Parashar Lake is a stunning freshwater lake located in the Mandi district of Himachal Pradesh, India, at an elevation of 2,730 meters (8,960 feet). This sacred lake is named after the revered sage Parashar, who meditated here, and is surrounded by the majestic Dhauladhar mountain range.

1. **Spiritual Importance:** The lake is considered holy, with a three-story pagoda-style temple dedicated to Sage Parashar, built in the 13th century by Raja Ban Sen.
2. **Natural Wonder:** The lake features a unique floating island, covering about 7% of its area, which moves with the wind.
3. **Ecological Significance:** The surrounding area is home to diverse flora and fauna, making conservation efforts crucial.
4. **Cultural Heritage:** The lake hosts the annual Saranahuli Mela, a vibrant festival showcasing local culture and traditions.

SESSION 2 (2:00pm-6:00pm): INDIAN ASTRONOMY

OBJECTIVE: To enable teachers to understand key contributions of ancient Indian astronomy – like Aryabhata’s model, calendar systems, and eclipse calculations – and integrate them into science/math lessons to develop scientific temper and cultural pride in students.

The group returned in the afternoon for a session on Indian Astronomy held from 3:30 PM to 5:30 PM. The session was led by Dr. Pandu Santhoju, a researcher who has co-authored papers on astronomical models based on the ancient Indian text *Sūryasiddhānta*, focusing on a mathematical model for calculating planetary positions. He is affiliated with the Department of Humanities and Social Sciences and has also published work on other topics, including a talk on the Vedic perspective of the origin of the universe.

The session focused on the rich history and significant contributions of India to the field of astronomy, highlighting ancient scholars, their discoveries, and the scientific heritage of the nation. It was an informative and engaging session that deepened participants’ understanding of India’s astronomical legacy.



Dr. Pandu leading the session on Indian Astronomy and explaining the existence of Nakshatra and Rashi

Following a short break, participants gathered for a rehearsal of a skit based on the Ramayana from 5:45 PM to 6:45 PM. The rehearsal was filled with enthusiasm, creativity, and teamwork as participants prepared for the upcoming performance.

CONCLUSION: The day concluded with a delightful dinner at 7:00 PM, bringing an end to a fulfilling and well-organized day of learning, exploration, and cultural engagement.

Day 5 Date: 14th November 2025

SESSION 1 (9:00am-11:00am): YOGA AND PRANAYAMA FOR HOLISTIC DEVELOPMENT

OBJECTIVE: To equip teachers with knowledge and practices of Yoga and Pranayama to enhance students' physical health, mental focus, and emotional balance, fostering holistic development as envisioned in NEP 2020.

The session focused on the scientific and traditional foundations of Yoga and Pranayama for holistic well-being, particularly for school-aged participants. Yoga is an ancient Indian practice that integrates body, mind, and spirit to achieve harmony and well-being. Originating from the Sanskrit root *yuj* (to unite), yoga aims at the union of the individual self with universal consciousness. *Pranayama*, the regulation of breath, forms an essential part of yogic discipline and acts as a bridge between the physical and mental dimensions. Together, yoga and pranayama serve as powerful tools for holistic development, influencing physical health, emotional balance, mental clarity, and spiritual growth.

Key Takeaways:

1. Scientific and Traditional Foundations: Practices like Deep Breathing, *Bhastrika* (Bellows Breath), and *Anulom-Vilom* (Alternate Nostril Breathing) were explored for their role in improving concentration, enhancing oxygen flow, and balancing the nervous system.
2. Practical Application for Stress Management: A brief case study demonstrated that regular yoga practice is effective in helping students improve academic performance and manage stress.
3. Integration: Clarity was provided on integrating simple breathing techniques and asanas into daily school routines to support students' holistic physical, mental, and emotional development.

SESSION 2 (11:00am-1:00pm): AYURVEDA AND DIET: THE SCIENCE OF PERSONALIZED NUTRITION

OBJECTIVE: To enable teachers to understand Ayurvedic principles of Prakriti-based diet and apply them to promote students' health, immunity, and mindful eating habits.

The second morning session focused on Ayurveda and Diet as a time-tested model for preventive and integrative nutritional science. The lecture was led by Dr. Subhash Singh, Visiting Instructor, IIT Mandi. He quoted thus stating the definition of healthy person:

**"Samadoṣaḥ samāgniśca samadhātu malakriyāḥ |
Prasannātmendriyamaṇaḥ svastha ityabhidhīyate ||"**
(*Sutrasthana 9.4*)

Meaning: A person is healthy when *doshas*, *agni*, *dhatu*s, and *malas* are in balance, and mind, senses, and soul are joyful.

Key Takeaways:

1. Personalized Diet (*Prakriti and Dosha*): The core principle is that diet must align with an individual's unique psycho-physiological constitution (*Prakriti*), which is defined by the three *Doshas* (bio-energies):
 - *Vata* (Air/Ether): Needs moist, warm, and grounding foods.
 - *Pitta* (Fire/Water): Needs mild and cool foods to prevent inflammation.
 - *Kapha* (Earth/Water): Needs stimulating, light, and dry foods to counteract sluggishness.
2. The Significance of *Agni* (Digestive Fire): Strong *Agni* (metabolism) is considered the foundation of health, as it ensures complete nutrient absorption and digestion. Weak *Agni* produces *Ama* (toxins), which is the root cause of chronic diseases.
3. Practical Recommendations: Recommendations included consuming the largest meal at midday, mindful eating, and avoiding incompatible food combinations.
4. The Integration of Six Tastes (*Shad Rasa*): A complete meal must include all six tastes (Pungent, Sweet, Sour, Salty, Bitter, Astringent) for metabolic balance and satiety, which helps prevent overeating and cravings.

SESSION 3 (2:00PM-4:00PM): INTRODUCTION TO VEDIC LITERATURE

OBJECTIVE: To familiarize teachers with the structure, scope, and key knowledge domains of the Vedas to integrate their interdisciplinary wisdom into school subjects and foster cultural rootedness.

Led by Dr. Krishna Gajendra Panda, this post-lunch session gave a broad overview of Vedic Literature. Vedic literature is primarily classified into four *Vedas*, each containing four parts: *Samhitā*, *Brāhmaṇa*, *Āraṇyaka*, and *Upaniṣad*. The four *Vedas* are:

1. Ṛigveda

- Oldest Veda, comprising **1,028 hymns** in praise of various deities—Agni, Indra, Soma, Varuna, Ushas.
- Focus: cosmology, prayer, and philosophical inquiries (e.g., *Nasadiya Sukta*).

2. Sāmaveda

- Known as the “Veda of Melodies.”
- Basis of Indian classical music; contains chants derived from the Ṛgveda, designed for rituals involving singing.

3. Yajurveda

- Divided into the **Śukla (White)** and **Kṛṣṇa (Black)** Yajurveda.
- Provides formulas, instructions, and ritual procedures for performances like *yajña* and *sacrifice*.

4. Atharvaveda

- More practical and worldly in nature.
- Deals with healing rituals, daily life, ethics, medicine, household rites, and early philosophical ideas.

Key Takeaways:

1. The Vedas as a Reservoir of Knowledge: The discussion positioned the Vedas as a vast reservoir of knowledge across various disciplines, moving beyond a view of them as purely ritualistic texts.
2. Origins and Compilation: The written compilation of the Vedas is traditionally attributed to Maharshi Ved Vyaas, although the identity of the original "creator" remains unknown.
3. Engagement and Consolidation: The session concluded with a 30-question quiz to consolidate the learning from the past five days.

SESSION 4 (4:00PM-6:00PM): ETHICAL DUTY AND SUSTAINABLE LIVING (THE BHAGAVAD GITA)

OBJECTIVE: To help teachers draw from the Bhagavad Gita's concepts of Karma Yoga and Dharma to instill values of ethical responsibility, selfless action, and sustainable living in students.

This session focused on re-framing modern corporate and environmental responsibility through the philosophical lens of the Bhagavad Gita. Dr. Laxmidhar Behera enlightened us on sustainable way of living.

Key Takeaways:

1. Dharma as the Foundation: Sustainable living is presented as an imperative of Dharma (the law that sustains cosmic order), which extends human duty (Manav Dharma) to include environmental stewardship.
2. Karma Yoga: Selfless Action (*Nishkama Karma*): Actions toward sustainability (e.g., conserving energy, reducing waste) should be performed as a righteous action (*dharma*), detached from the results. This duty is an expression of selfless service (*seva*) for the world's welfare (*Lokasamgraha*).
3. Yajna: The Duty of Reciprocity: The concept of Yajna (reciprocity/sacrifice) mandates giving back more than is taken from nature. Modern Yajna involves actions like minimizing carbon footprints and planting trees, anticipating nature's reciprocation with essential resources (e.g., clean air).
4. Non-Attachment (*Aparigraha*): This principle validates the modern call for conscious, minimalist consumption. It promotes moderation and counters the material accumulation and excessive desire (*Trishna*) that drive environmental unsustainability.

CONCLUSION: Day 5 successfully synthesized classical concepts (such as Dharma, Agni, Prakriti, and Pranayama) with contemporary challenges (including nutrition, stress management, and sustainability). The sessions collectively underscored the practical relevance of ancient Indian knowledge systems as sophisticated frameworks for environmental stewardship, ethical leadership, and personal health in the modern era.

CLOSING CEREMONY AND CERTIFICATE DISTRIBUTION

The five-day IKS program culminated with a formal Closing Ceremony.

Highlights:

1. Acknowledgments: The organizing team, facilitators, and speakers were formally acknowledged for their valuable contributions.
2. Artistic Contributions: The artistic talent of the participating group was celebrated with the display of three portrait paintings created by Ms. Deepti Meena, Ms. Akshi Babbar, and Ms. Rekha Yadav.
3. Gestures of Gratitude: Ms. Rekha Verma presented beautiful thank you cards as a thoughtful gesture to acknowledge all participating participants, faculty members, kitchen staff, and others who contributed to the program's success.

Certificate Distribution: All participating teachers and staff were presented with Certificates of Completion, a self-written book "The Absolute Truth" by Dr. Laxmidhar Behera, and a Himachali Cap signifying their active participation and successful consolidation of learning across the diverse topics of the Indian Knowledge Systems.



Successful completion of 5 Days CDP (IKS) training

Feedback from participants: Participants found the IIT Mandi IKS program highly enriching and transformative, praising the expert sessions for simplifying complex concepts like Indian astronomy, Ayurveda, and Vedic literature into classroom-ready ideas. The hands-on Yoga and IKS-integrated pedagogy workshops were rated most useful, while the campus environment and peer networking were deeply motivating. Teachers requested more low-cost, rural-context examples and regular follow-up support to implement NEP 2020 goals effectively. Overall, they felt empowered to blend India's intellectual heritage with modern education and sought similar trainings annually.

Plan for Implementation of Learning Outcomes (by Participants): Participants of the IKS program at IIT Mandi will implement learning outcomes through a 3-phase action plan: Within 7 days, they will share key takeaways with staff, select 1 chapter for IKS integration, and set up a peer support group. In 1 month, each teacher will pilot 2 IKS-integrated lessons using storytelling/toy-based methods, start an IKS Corner, and add competency-based questions to assessments. Within 3–6 months, they will map IKS across subjects, conduct student projects and an IKS Mela, document best practices for SCERT, and mentor nearby schools. Success will be measured by student ability to connect IKS to daily life, improved Holistic Progress Card descriptors, and 80% students naming 3 Indian contributions to science. Regular DIET follow-up and evidence submission will ensure sustained implementation.

Glimpses of the Capacity Building Program/Leadership Development Program

